

NITROCELLULOSE - FIRE AND POTENTIAL EXPLOSION HAZARD

Nitrocellulose paper is used in a variety of laboratory electrophoresis and gel-diffusion procedures, including the Western blot test. Centrifuge tubes made of cellulose nitrate are also widely used. Nitrocellulose poses a well-recognized fire hazard and can be ignited at most ambient temperatures likely to be encountered in operating laboratories.

Additionally, nitrocellulose may be highly reactive and can detonate or explode when heated under the confinement conditions present in the closed chamber of a steam autoclave. Therefore, potentially infectious gels deposited on nitrocellulose paper or cellulose nitrate centrifuge tubes should **not** be decontaminated by autoclaving. Instead such materials should be decontaminated by immersing in a 10% aqueous solution of household laundry bleach (Clorox) for 15 minutes. Following removal from the bleach solution, nitrocellulose can be disposed of by placing it in a "Burnable" dumpster.

Please telephone EHS at x1451 if you have any questions or require additional information.

[Adapted from MMWR, July 12, 1985]